

- 1 -

piece 1, NC_000913, astC_xthA+, config: linear, direction: +, begin: 1829977, end: 1830471

5' *1829980 * *1829990 * *1830000 * *1830010 * *1830020 * *1830030 * *1830040 * *1830050 *
- lys - val - phe - thr - arg - asn - trp - leu - arg - his - ser - asp - leu - tyr - ser - lys -
- lys - phe - ser - arg - val - ile - gly - ser - phe - his - ala - fMet - ala - glu - thr -
- ser - phe - his - ala - fMet - ala - glu - thr -
...] NC_000913.astC

5' *1830060 * *1830070 * *1830080 * *1830090 * *1830100 * *1830110 * *1830120 * *1830130 *
- val - cys - ala - val - asn - val - asp - cys - arg - val - arg - ala - ser - gln -
- phe - ala - leu - fMet - lys - cys - arg - leu - gln - gly - ser - cys - gln - pro - val - ile - lys - val - his - lys - arg - arg - leu -
- fMet - arg - cys - lys - cys - arg - leu - gln - gly - ser - cys - gln - pro - val - ile - lys - val - his - lys - arg - arg - leu -
... sd

p35 4.3 bits

{ ... p35-(23)-p10 1830155 Gap
... p35-p10 1830155 total 4.0 bits

5' *1830140 * *1830150 * *1830160 * *1830170 * *1830180 * *1830190 * *1830200 * *1830210 *
- fMet - his - leu - lys - cys - ile - fMet - asn - thr - phe - ala - met - trp - val - asn - lys - lys -
- gly - val - ile - thr - lys - pro - tyr - ala - phe - lys - val - his - ile - lys - fMet - arg - cys - gly -
... sd

{ ... sd-(18)-ir 1830160 Gap 6.9 bits ir astC_xthA+ p10 3.1 bits ... sd
... } p35-(23)-p10 1830155 Gap 1.4 bits ir astC_xthA+

| p35-p10 1830155 total 4.0 bits { ... sd-ir 1830160 astC_xthA+ total 5.5 bits
... } p35 1.8 bits sd

| p10 1.1 bits | sd-ir 1830182 astC_xthA+ total 5.1 bits

| p10 5.1 bits { ... p35-(22)-p10 1830168 Gap 2.3 bits
... } p35-p10 1830168 total 4.5 bits p35 5.6 bits

| p35-(22)-p10 1830188 Gap 2.3 bits
| p35-p10 1830188 total 6.3 bits

5' *1830220 * *1830230 * *1830240 * *1830250 * *1830260 * *1830270 * *1830280 * *1830290 * *1830300 *
- lys - arg - asn - val - met - gln - lys - fMet - leu - cys - arg - ser - lys - ile - fMet - ile - ile - asp - glu - ile - tyr - trp - lys - leu - leu - arg - his -
- lys - arg - asn - val - met - gln - lys - fMet - leu - cys - arg - ser - lys - ile - fMet - thr - lys - phe - thr - gly - asn - tyr - cys - ala - ile -

| sd { ... sd-ir 1830262 Gap 5.4 bits ir astC_xthA+ p10 3.4 bits

{-----} sd-(8)-ir 1830233 Gap 2.4 bits

|-----| sd-ir 1830233 astC_xthA+ total 7.9 bits



{-----} sd-(12)-ir 1830269 Gap 4.0 bits

|-----| sd-ir 1830269 astC_xthA+ total 6.9 bits

p35 4.4 bits

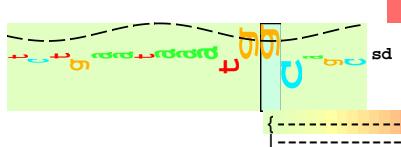
{-----} p35-(23)-p10 1830279 Gap 1.4 bits

|-----| p35-p10 1830279 total 6.4 bits

5' * *1830310 * *1830320 * *1830330 * *1830340 * *1830350 * *1830360 * *1830370 * *1830380
- ser - asp - ala - ala - arg - thr - lys - ser - gly - his - phe - leu - arg - his - arg -
- leu - thr - gln - arg - ala - pro - lys - ala - gly - ile - phe - cys - ala - ile - val - asp - ile - ile -
- fMet - thr - ser - leu - thr - thr - ile - asn - asn - his - arg - ser - asn - his - leu - thr -
[###] orf 29 codons

5' * *1830390 * *1830400 * *1830410 * *1830420 * *1830430 * *1830440 * *1830450 * *1830460
- thr - gly - gly - lys - gln - arg - glu - ile - leu - pro - ser - thr - his - ser - leu - ser - glu -
- fMet - ala - ala - thr - met - lys - phe - val -
[###] orf 57 codons

... NC_000913.xthA



{-----} sd-(9)-ir 1830452 Gap 2.3 bits

|-----| sd-ir 1830452 astC_xthA+ total 9.0 bits

5' * *1830470
- ser - phe -

... NC_000913.xthA

... ir astC_xthA+